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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/018,006

03/28/2002

Alexander Pilger

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EXAMINER

AVELLINO, JOSEPH E

ART UNIT

PAPER NUMBER

2143

MAIL DATE

DELIVERY MODE

10/05/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

# Office Action Summary

Application No.

10/018,006

Applicant(s)

PILGER ET AL.

Examiner

Joseph E. Avellino

Art Unit

2143

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 06 September 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 7-11, 13-16 and 18 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 7-11, 13-16 and 18 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

1. Claims 7-11, and 13-16 are presented for examination; claim 7 independent.

***Continued Examination Under 37 CFR 1.114***

2. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on February 20, 2007 has been entered.

***Claim Rejections - 35 USC § 102***

3. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claims 7-11, 13-15, are rejected under 35 U.S.C. 102(e) as being anticipated by Fijolek et al. (USPN 6,223,222) (hereinafter Fijolek).

4. Referring to claim 7, Fijolek discloses a communication system utilizing a network (Figure 1), comprising:

a user computer (i.e. CPE 18) connected to the network 14 (Figure 1) including an access unit (i.e. Cable Modem 16) which determines predetermined QoS features for interaction with the network (i.e. requests a particular QoS, and performs the communication at the acquired QoS) (e.g. abstract; Figure 18; col. 29, line 55 to col. 30, line 7); and

a service provider computer (i.e. QoS Server 332) connected to the network 14 (Figure 1), providing the predetermined QoS features to said access unit, to enable the QoS features of the access unit (i.e. provide a QoS identifier to the cable modem to perform communications at the requested CoS and rate) prior to the utilizing of the QoS features by said access unit (i.e. the QoS server gives the identifier to the CM 16 which then uses the permitted QoS on the data network 28 (Figures 18, 19, and 27; col. 29, line 55 to col. 30, line 7; col. 36, lines 44-61); and

a database, connected to the service provider computer, to determine which of the predetermined QoS features (i.e. identifiers) are currently permissible for the user computer (i.e. what identifiers are currently used for each indication of CoS, QoS and other related parameters requested by the modem (col. 29, line 55 to col. 30, line 5).

5. Referring to claim 8, Fijolek discloses the network is the Internet (i.e. data net 28) (Figure 1).

6. Referring to claim 9, Fijolek discloses the access unit is an autonomous device (i.e. a cable modem is considered an autonomous device) (Figure 1, col. 6, lines 30-35).

7. Referring to claim 10, Fijolek discloses the access unit is a plug-in device for the first computer (the Office takes the term “plug-in device” to be broadly construed as “a device which can be physically or logically connected to a computer” such as the cable modem can be “plugged into” the CPE 20 via an Ethernet cable) (Figure 1).

8. Referring to claim 11, Fijolek discloses the access unit is a processor of the first computer programmed to determine predetermined QoS features for interaction with the network (i.e. since the interface device acts on behalf of the first computer, it can be considered that the interface access device processor is a processor of the first computer since without the interface, the first computer would be unable to access the network (col. 29, line 55 to col. 30, line 5).

9. Referring to claim 13, Fijolek discloses the QoS computer is assigned to an ISP (i.e. data over cable system 330 is part of the ISP network) (col. 29, line 55 to col. 30, line 5).

10. Referring to claim 14, Fijolek discloses the QoS features are called up dynamically in the access unit (the Office takes the term “called up” as created) (col. 5, lines 56-67).

11. Referring to claim 15, Fijolek discloses the access unit (i.e. cable modem) converts from a first protocol (i.e. Ethernet connecting the cable modem with the CPE 20) to a second protocol (i.e. the protocol used to transfer data over a cable network, commonly known as DOCSIS) (col. 6, lines 30-35).

12. Claim 18 is rejected for similar reasons as stated above. Furthermore Fijolek discloses that the QoS features for a user are stored, and determined in advance of the user connecting to the network (i.e. Tables 10-25 describe the features of the quality of service classes for which a user can access a network; these features are determined before the user is connected).

***Claim Rejections - 35 USC § 103***

13. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claim 16 is rejected under 35 U.S.C. 103(a) as being unpatentable over Fijolek in view of Loukianov (USPN 6,249,526).

14. Fijolek discloses the invention substantively as described in claim 7. Fijolek inherently requires that the access unit is incapable of operation without additional components (i.e. a power cord to provide power to the modem, as well as data cables to connect various components to the modem). Fijolek does not specifically state that the

cable modem is an integral component to the user computer. In analogous art, Loukianov discloses another communications system utilizing a network (Figure 1, ref. 100) which discloses a cable modem as an integral component to the user computer (i.e. "the cable modem unit 300 is in the PCI form factor such as one of the peripheral devices"; a device in the PCI form factor cannot operate without being connected to the client computer, which delivers power and timing configurations, which satisfies the definition of being an "integral" component to the client computer) (Figure 3; col. 4, lines 8-14). It would have been obvious to one of ordinary skill in the art to combine the teaching of Fijolek with Loukianov in order to help the cable modem of Fijolek perform time-critical tasks without an on-board processor and accommodate the changing specifications in the protocol without modification to the hardware as supported by Loukianov (col. 1, lines 43-48).

Claim 18 is rejected under 35 U.S.C. 103(a) as being unpatentable over Fijolek in view of Vaid et al. (USPN 6,137,777) (hereinafter Vaid).

15. Fijolek discloses the invention as described in claim 1. Fijolek does not expressly disclose that the QoS features are stored in advance of a user connection to a network. In analogous art, Vaid discloses a firewall device which discloses associating a specific quality of service features with a user (i.e. defining a traffic class based on the source/destination address of a user, and then providing a traffic policy; all of which is preassigned before a user initiates a data transfer) (col. 12, line 53 to col. 13,

line 55). It would have been obvious to one of ordinary skill in the art to combine the traffic classes of Vaid with the QoS server of Fijolek in order to differentiate various quality of services based on the type of traffic being transported, thereby providing a more efficient method of bandwidth management.

### ***Response to Arguments***

16. Applicant's arguments filed September 6, 2007 have been fully considered but they are not persuasive.

17. In the remarks, Applicant argues, in substance, that (1) Fijolek does not disclose a database to determine the quality of service features, and (2) Fijolek does not disclose a database which stores in advance features for a user.

18. As to point (1), Applicant is incorrect. Applicant is directed to review Fijolek, specifically col. 36, which shows TABLE 23, which describes a plurality of QoS identifiers and to which class of service each identifier belongs. This clearly meets the claimed database. By this rationale, the rejection is maintained.

19. Applicant's other arguments are rendered moot in view of the new grounds of rejection presented above.



***Conclusion***

20. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

21. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

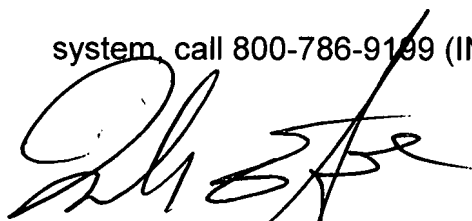
A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Joseph E. Avellino whose telephone number is (571) 272-3905. The examiner can normally be reached on Monday-Friday 7:00-4:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David A. Wiley can be reached on (571) 272-3923. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2143

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

A handwritten signature in black ink, appearing to read 'Joe Avellino', is written over the text of the signature block.

Joseph E. Avellino, Examiner  
September 14, 2007